

- 1 In July, a supermarket sold 45 981 bottles of fruit juice.

- (a) The cost of a bottle of fruit juice was \$1.35 .

Calculate the amount received from the sale of the 45 981 bottles.
Give your answer correct to the nearest hundred dollars.

$$45981 \times \$1.35 = \$62074.35$$

$$\approx \$62100$$

Answer(a) \$ 62100 [2]

- (b) The number of bottles sold in July was 17% more than the number sold in January.

Calculate the number of bottles sold in January.

January	July	
100%	117%	$x = \frac{100}{117} \times 45981$
x	45981	$= 39300$

Answer(b) 39300 [3]

- (c) There were 3 different flavours of fruit juice.

The number of bottles sold in each flavour was in the ratio apple : orange : cherry = 3 : 4 : 2.
The total number of bottles sold was 45 981.

Calculate the number of bottles of orange juice sold.

$$\frac{4}{3+4+2} \times 45981 = \frac{4}{9} \times 45981$$

$$= 20436$$

Answer(c) 20436 [2]

- (d) One bottle contains 1.5 litres of fruit juice.

Calculate the number of 330ml glasses that can be filled completely from one bottle.

$$1.5 \text{ litres} = 1.5 \times 1000$$

$$= 1500 \text{ ml}$$

$$\frac{1500}{330} = 4.54$$

$$\approx 4$$

Answer(d) 4 [3]

- (e) $\frac{5}{9}$ of the 45 981 bottles are recycled.

Calculate the number of bottles that are recycled.

$$\frac{5}{9} \times 45981 = 25545$$

Answer(e) 25545 [2]